

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (Currently amended) A method for the formation of a good contact surface having good electrical conductivity on [[a]] an aluminium support bar of an electrode used in electrolysis, comprising:
 - i) immersing an electrode plate in the electrolysis cell, supporting a plate support bar by its ends on the edges of the electrolysis cell wherein the highly electroconductive end is held on a busbar; forming a highly electroconductive layer on at least one end of the aluminium support bar, and made of aluminium,
ii) coating the lower surface of the aluminium end of the bar, the contact surface, with silver or a silver alloy,
and forming a metallurgical bond with wherein a metallurgical bond is formed between the aluminium support bar and highly electroconductive coating material, and wherein the aluminium support bar is for immersing an electrode plate in an electrolysis cell and for supporting a plate support bar by its ends on the edges of the electrolysis cell so that the highly electroconductive end is held on a busbar.
2. (Previously presented) The method according to claim 1, wherein the silver alloy is silver-copper.
3. (Previously presented) The method according to claim 1, wherein the highly electroconductive coating layer is formed of two layers having a transmission layer between them wherein the first layer is copper and the second silver or silver alloy, the transmission layer being tin or tin-dominate alloy.

4. (Previously presented) The method according to claim 1, wherein the support bar is equipped with a casing section made of some other material.
5. (Previously presented) The method according to claim 1, wherein the highly electroconductive coating layer is formed using thermal spraying technique.
6. (Previously presented) The method according to claim 5, wherein the thermal spraying technique is based on gas combustion.
7. (Previously presented) The method according to claim 5, wherein the thermal spraying technique is high velocity oxy-fuel spraying.
8. (Previously presented) The method according to claim 1, wherein the highly electroconductive coating material is in powder form.
9. (Previously presented) The method according to claim 5, wherein the thermal spraying technique is flame spraying.
10. (Previously presented) The method according to claim 1, wherein the highly electroconductive coating material is in wire form.
11. (Currently amended) The method according to claim 3, wherein the first layer is formed by thermal spraying technique and the second layer is formed by soldering.
12. (Currently amended) The method according to claim 1, wherein at least one end of the aluminium support bar is furnished on the lower surface with a notch, and that wherein the notch area is coated with a highly electroconductive material.

13. (Currently amended) A support bar for an electrode used in electrolysis, wherein a plate section of the electrode is immersible in an electrolysis cell and a support bar is supportable by its ends on the edges of the electrolysis cell, wherein the area on the lower surface of the end of the aluminium support bar, the contact surface, comprising comprises a highly electroconductive coating layer of silver or silver alloy and wherein said highly electroconductive coating layer forms a metallurgical bond with the aluminium support bar.

14. (Previously presented) The support bar according to claim 13, wherein the silver alloy is silver-copper.

15. (Previously presented) The support bar according to claim 13, wherein the highly electroconductive coating layer is formed of copper and silver with a transmission layer between them.

16. (Previously presented) The support bar according to claim 13, wherein the support bar is equipped with a casing section made of some other material.

17. (Previously presented) The support bar according to claim 13, wherein the highly electroconductive coating layer is formed using thermal spraying technique.

18. (Previously presented) The support bar according to claim 15, wherein the highly electroconductive coating layer is formed using thermal spraying technique and soldering.